

# What is it?

As well as celebrating the past, the festival will highlight today's pioneering workers in energy production, and engage everyone in the discussion about sustainable energy choices. Ways to get involved:

- Create exhibitions
- Take part in campaigns
- Organise lectures and lively debates
- Learn about women's contributions to energy generation and use
- Have your say about today's energy options and sustainability
- Discover the opportunities for women and girls in the electricity industry
- Explore progress towards a hydrogen future

# **Our aims**



To enlighten participants about energy generation and use



To highlight women's pioneering role in the electricity industry



To spread awareness of the climate crisis and the measures needed to reduce its impact



To celebrate and inspire the women shaping our futures

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#### Dreams past

Women, electricity, and power generation aren't often linked together. And yet women were pioneers, seeing the potential for how electricity can transform our lives.

The EAW was set up to educate all women in the science of electricity, to engage, inspire, and encourage women to use this form of energy, to contribute to its safety and standards, and to make it work for them in a home environment.

The All-Electric House in Bristol, designed by the EAW in 1935, the Electrical Housecraft School in London, and The Electrical Age magazine are among the innovations that will be reinterpreted for Electric Dreams 2024.



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Still, in 2022, only 14% of electrical & electronic undergraduate engineers are women

prospects for a hydrogen-powered home. Dreams 2024.

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### **Get involved with the Electric Dreams team**

The Electric Dreams festival has been devised by a team with wide experience championing women in all sectors of engineering and campaigning to increase the proportion of women in the profession. They include Nina Baker, Dawn Bonfield, Helen Close, Graeme Gooday, Henrietta Heald, Anne Locker and Jan Peters.

Contact the Electric Dreams team electricdreams@cloudesley.co.uk

# **FESTIVAL OF WOMANPOWER**

2024 marks the centenary of the formation of the **Electrical Association for Women** (EAW)

The Festival of Womanpower will celebrate the legacy and achievements of this pioneering organisation, whilst take a fresh look at the role of women today in facilitating the energy transition to renewable and sustainable energy.

# FIRST SOME HISTORY

The EAW was an organisation whose mission from the early days in 1924 was to popularise the domestic use of electricity, and it acted as a vehicle for the education of lay women about electricity, and as an advisory body to the industry on matters of policy, asserting the need for safe and practical appliances in the home to reduce the burden of women's domestic work.

Essentially, it brought engineers and housewives together, acting as a liaison between (mostly male) engineers who did not understand what women wanted, and housewives who could not follow the technical language.

# AIMS OF THE EAW

The stated aims of EAW were:

- To make provision for the education and to give instruction and training to women and others about electrical energy, domestic science, hygiene and social welfare
- To promote, encourage and further education and research relating to the use of electrical energy in connection with matters of particular interest to women
- To examine persons as to their knowledge with respect to electrical energy and its use, and domestic science
- To ensure electrical safety

# MABEL MATTHEWS WAS THE FOUNDER



"When I was haymaking during the war, an old of farm hand came to me and said, "Now ma'am, this is a job where you can work hard or you can work light, what you want is to work light".

I've never forgotten that, and I look round and see lots of women working hard when they might work "light" with equally effective results. This is where electricity can help: and not only in regard to work but in health, hygiene and greater comfort in the home.

The average middle-class housewife and prosperous working women are very shrewd and thrifty persons but they are very much apt to overlook the fact that thrift of one's energies is often more vital than thrift of money. It is by this form of thrift that electricity in going to help women."

Mabel Matthews, Founder of EAW



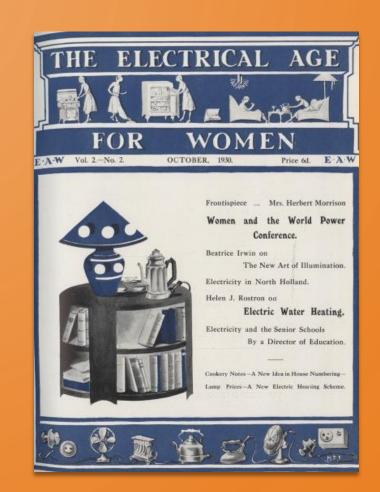
# MANY KEY SUPPORTERS

"...the twin keys to women's earthly paradise were the Vote and Electricity."

Ellen Wilkinson MP (1891-1947)

# THE ELECTRICAL AGE FOR WOMEN - EDUCATION

Education was one of the primary aims of the EAW, which it pursued through its journal, The Electrical Age, and through lectures, summer schools for teachers and school visits, amongst other activities. By 1933 the EAW was accepted as the primary communicator and educational pestablishment with regard to electricity Cand its domestic applications.



### **TRAINING & CERTIFICATION**

The 'EAW Electrical Housecraft' course was given at most domestic science and technical colleges in the country. A certificate and diploma in electrical housecraft for teachers in schools and colleges followed instruction on "the application" of electricity to household duties". The Diploma for Demonstrators and Saleswomen was first offered in 1931, and by the 1940s its Electrical Housecraft Certificate and diploma were recognised qualifications. A home worker's certificate was introduced for housewives and students, covering electricity generation and transmission, home installation of meters, fuses, switches, cookery, refrigeration, kitchen planning and similar applications.

#### ELECTRICAL ASSOCIATION FOR WOMEN



#### THIS DIPLOMA

in

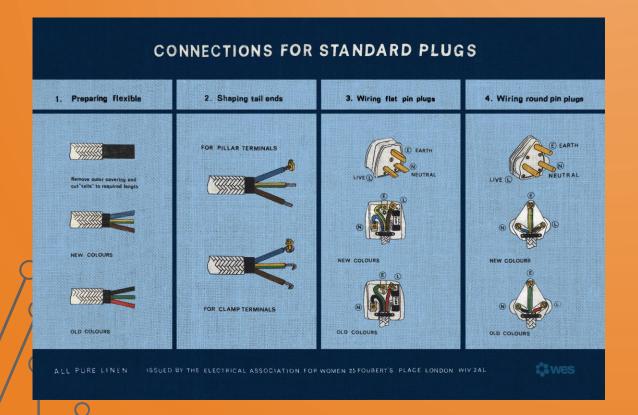
# Electrical Housecraft

is Awarded to

who has satisfied the Examiners as to Training and Experience and has passed practical tests and a vivâ voce examination

The holder of this Diploma is a qualified Housecraft Adviser

# THE ELECTRICAL AGE FOR WOMEN - SAFETY



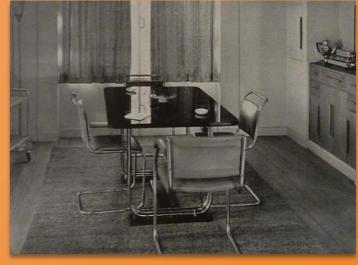
Electrical safety was another important facet of the programme, and in the 50s and 60s the EAW produced teatowels, dusters and pinnies to explain the principles of electricity and electrical safety to women.

Dame Caroline Haslett, the Association's Director, was prominent and influential woman and between 1953-1954 was Chair of the British Electrical Development Association, the first time a woman had been appointed to that office, and the only woman member of the British Electricity Authority 1947-1956.

# ELECTRIC HOUSE, BRISTOL

In 1935 the All Electric House was commissioned by the Bristol Branch of the Association and featured all kinds of electrical appliances and gadgets from an electric cooker, refrigerator and fires in every room to drying cupboards, electric clocks and food warmers.









# INTERNATIONAL INFLUENCE

The EAW continued to flourish until the 1970s – both in the UK and abroad with organisations in The Netherlands (1932); Australia (1934); New Zealand (1960); Trinidad and Tobago (1961) The Trinidad and Tobago branch is still going strong today <a href="https://ttec.co.tt/default/eaw-about-us">https://ttec.co.tt/default/eaw-about-us</a>



# **EAW TODAY**

In the mid-1980s the organisation was no longer attracting new members and was voluntarily dissolved in 1986. Its work in encouraging women to use electricity in domestic settings had been accomplished, and its pivotal influence in getting women out of the home and into the workplace had been achieved.

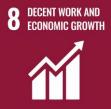
In 2024 we celebrate the remarkable achievements of this organisation, and bring their message up to date with a campaign to inform, inspire and encourage women to have their say in the crucial energy conversations of today.





















# THE PLAN FOR 2024

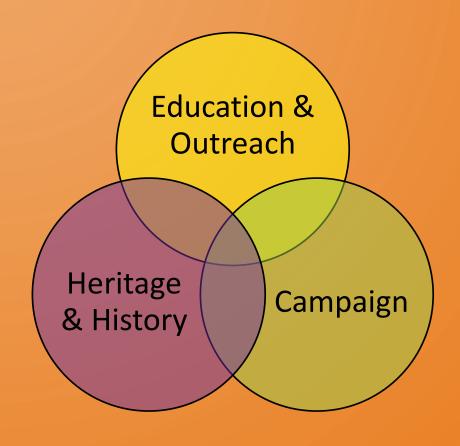
During the centenary year many opportunities are available, from schools outreach and public engagement, to careers advice and policy influence – with a view to both celebrating the work of EAW and educating the next generation of energy users and creators.

Today, renewable energy generation and security are vital components of our shift to net zero, and the technology is constantly improving, but the best way forward can seem like a confusing picture. The question of local versus national generation; the falling costs of wind, wave, tidal and solar; the phasing out of oil and gas; the pros and cons of nuclear generation – both fusion and fission; the move to hydrogen generation – green or grey; in combination with battery storage...these are all questions that we are grappling with that can seem a confusing mix.

The opportunity for this centenary year is to engage in these conversations, simultaneously educating and inspiring action and further engagement. Not only are the technologies of interest to explore, but some of the human stories too, of the women and men who are working in fields, and what they have achieved.

# **ACTIVITY STRANDS WOULD INCLUDE:**

- Education, Outreach and Careers
- Heritage and History
- Campaigning





# SCHOOL OUTREACH

A schools outreach activity and set of resources are envisaged, which can be delivered by individuals to schools in their vicinity, which includes learning about the history of EAW; about the future energy challenges; and about the women working in these industries.

In the same way as resources have been developed for International Women in Engineering Day, this campaign will create open access resources which users are encouraged to edit and deliver themselves.

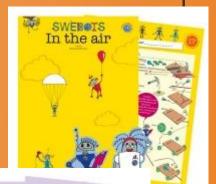
The resources will include elements of history, creativity, art and design, literature, engineering, and careers, and will link to the science curriculum around electricity and energy.

# GIRL GUIDE REGIONAL BADGE

Ideally a collaborative project, it is proposed that a Girl Guide badge and resource pack be developed to commemorate the centenary, in the style of similar ones shown on the SWEBOTS and STEM webpage of the South West Region. <a href="https://www.girlguidingsouthwest.co.uk/swebots-stem-resources">https://www.girlguidingsouthwest.co.uk/swebots-stem-resources</a>. The badge could include topics such as:

- History of the EAW
- Social history of women and work
- Electricity and electrical safety in the home
- Today's energy issues, e.g. cost of data (e.g. storage of emails, selfies, datacentres etc), energy behaviour
- Structure of materials, atoms and electrons magnetism and conduction
- What is electricity—creating electric flow using water, learning the symbols of electrical compone wiring to illuminate a bulb
- Batteries—what are they, how do they work, find a way to illustrate this
- Designing a Comms Campaign, based on the 'How to wire a plug' Teatowels
- $^\prime$  Taraday and the Waterloo Bridge experiment—Draw an illuminated Waterloo bridge to illustrate t
- Activities linked to Lightening, Static electricity, hydro-energy, renewable energy















A physical exhibition of the work of EAW would be an ambitious target, but this could be possible through partnership with an organisation like the Design Museum, or the Museum of the Home.

An accompanying online exhibition would document the work of EAW and involve partner organisations such as the Electrifying Women project, as well as housing other information related to the Festival. https://electrifyingwomen.org/

It is also proposed that local museums be approached to add relevant information to their current displays to commemorate the centenary and the work of EAW, in order to create a regional or travelling campaign.



# **HERITAGE AND HISTORY**

- Research
- Possible Publication of a book
- Blue Plaque Campaign
- Digitisation of The Electrical Age Journal



# **BLUE PLAQUES**

Education & Outreach
Heritage & Campaign

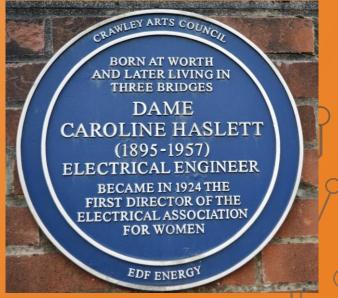
Due Plaques are a great way of commemorating the achievements of the women involved in EAW, as well as creating local interest and involvement in the project.

There have been a number of pivotal women involved with the electrification revolution since the formation of the Electrical Association for Women, and whilst some of them have been recognised (such as Caroline Haslett), others have not.

A list of Blue Plaque nominations will be considered, including the ones below, and we will be looking for local groups and organisations to take these forwards.

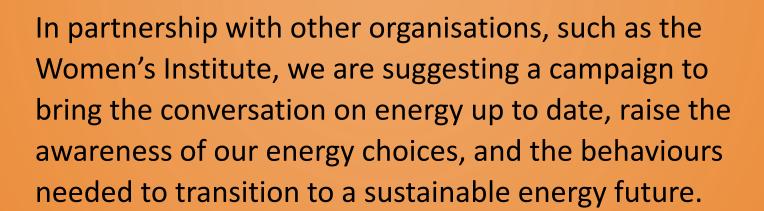
- Marjorie Bell
- Veronica Drake Demuth
- Jeanie Dicks
- Gertrude Entwistle
- Anne Gillespie Shaw
- Mrs Gertrude Ince Ferranti
- Elizabeth Kennedy (Glasgow)
- May Maple
- Edith May (Mrs Penders Chalmers)
- Veronica Milligan
- Margaret Moir
- Margaret Partridge
- Maria Watkins







### **CAMPAIGNS**



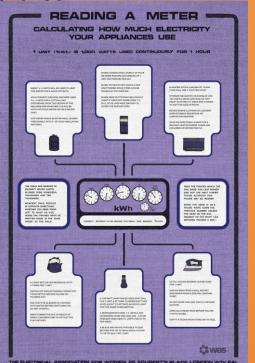
We are proposing an evidence gathering campaign in 2023 to inform our campaign themes, followed by a wide ranging and positive campaign in 2024.





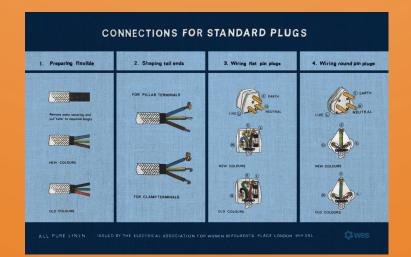
### **MERCHANDISE**





Merchandise was a key feature of the Electrical Association for Women, with teatowels, dusters, and pinnies all being used effectively to disseminate information and empowerment.

The campaign side of the Festival could be accompanied by a competition to design and print a new set of Teatowels or other merchandise to represent our energy conversations and related issues today, in the same way as those of the past brought these issues to life.





# **PARTNERS**

Partners and funders are key to the success of this project, and support will be sought both in kind, and through financial contributions. Please get in touch if you are interested in learning more, or becoming involved.

The ethos of the Festival is shared ownership, and we will encourage partners to create their own events, communications, and engagement strategies around the history, heritage, campaigns and messages associated with this year of celebrations.

# PROJECT STEERING GROUP

Nina Baker

**Dawn Bonfield** 

**Graeme Gooday** 

Henrietta Heald

Anne Locker

Jan Peters









# SOME REFERENCES

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- Electrifying Women <a href="https://electrifyingwomen.org/">https://electrifyingwomen.org/</a>
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- Magnificent Women <a href="http://www.magnificentwomen.co.uk/eaw.html">http://www.magnificentwomen.co.uk/eaw.html</a>
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- The All Electric House see additional resource page

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- SSE Heritage Site, showing a photograph of the opening ceremony <a href="http://www.sseheritage.org.uk/index.asp?page=list&mwsquery=%7Bsection%7D=%7Bphotographs%7D&mwsquery=(%7Bsearch%7D=\*%7BEAW%7D)&filename=CHREM&hitsStart=1">http://www.sseheritage.org.uk/index.asp?page=list&mwsquery=%7Bsection%7D=%7Bphotographs%7D&mwsquery=(%7Bsearch%7D=\*%7BEAW%7D)&filename=CHREM&hitsStart=1</a>
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